approves of the proposed corrections, Applicant will furnish a new sheet 6 with Figure 5 corrected as shown.

The Examiner also objected to the specification for two informalities on page 6 thereof. Applicant has amended the specification at page 6 to bring the description of Figure 1 in conformity with what is shown in this Figure. No new matter has been introduced.

In light of the above, it appears that this application is in a state of allowance. A prompt notice of allowance is therefore respectfully requested. If the Examiner has any further questions regarding this application, please contact the undersigned at the phone number below to resolve them.

Please charge any fee associated with this matter to Deposit Account No. 07-0832.

Respectfully Submitted,
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25 Nov 2002
Date

NEW PAGE 6:

provide interpolated data, that is upsampled or downsampled by the desired sampling factor, to delay network 20 which may employ transfer functions that are either the same, or different, as desired.

The data from unit 13 of interpolation network 10 is provided to multiplexer 33 via both delays 24 and 26 and to multiplexer 27 and also to multiplexers 29 and 31 via delays 24 and 26. The data from unit 15 of interpolation network 10 is provided to multiplexers 31 and 33 via delay 22 and to multiplexers 27 and 29. In this configuration, units 22, 24 and 26 of network 20 comprise multiple tapped delay lines providing outputs of delayed upsampled interpolated data samples of higher resolution than the sample spacing of the input data from unit 17. Multiplexers 27, 29, 31 and 33 multiplex the inputs received from units 10, 22, 24 and 26 to provide a selected set (selected from between two available sets) of upsampled delayed samples to digital filter 40.

Multiplexers 27, 29, 31 and 33 multiplex between the two sets of upsampled delayed inputs from units 10, 22, 24 and 26 in response to a position representative selection signal identifying the upsampled delayed output sample set spatially encompassing (i.e. straddling) the corresponding position of the converter output sample whose value is currently being determined by the sample rate converter system of Figure 1. Specifically, this selection signal identifies and selects the set of four upsampled delayed output samples comprising the two upsampled delayed output samples located either side of the corresponding output sample being determined by the Figure 1 converter system. In the configuration of Figure 1, the selection signal input to multiplexers 27, 29, 31 and 33 comprises the MSB (most significant bit) of a position index signal used by filter 40 to spatially interpolate between two input samples being processed.

The set of four upsampled delayed output samples provided by network 20 to digital filter 40 consist of multiple $\frac{T}{n}$ spaced delay line outputs (taps) comprising higher resolution second sample spacing data surrounding the output sample time desired (where T is the period between samples of the input sample data from unit 17 and n is 2 in the architecture of Figure 1).

Other architectures with other values of n may be derived by replacing an isolated tapped delay line with the advantageous generalized delay line arrangement in accordance with the invention principles. For example, in the arrangement of Figure 5 (discussed later), the

generalized delay line of Figure 1 is extrapolated to provide n=3. Further, the use of the generalized delay line configuration of Figure 1 facilitates the processing of the input sample data at a single data rate. Specifically, the configuration of Figure 1 enables filter 17, interpolation network 10 and delay network